

ATI BOLT-ON SFI BELL HOUSINGS

**Standard Bolt-On
Bell Housings**

- #200044 - T350 and T400
- #200045 - Powerglide
- #200046 - Metric 200

**Direct Fit Bolt-On
Bell Housings**

- #200044A - T350 and T400
- #200045A - Powerglide
- #200046A - Metric 200

ATI offers two different versions of the “Bolt On” style SFI Bell Housing. The “Standard” version is designed to bolt onto the face of the pump and the case finish is not as critical. The “Direct Fit” version is designed to actually indicate on the outside diameter of the pump and requires precise machining

NOTE: ATI can prep your case for you if you would like the “Direct Fit” version but do not have access to proper machining equipment.

STEP 1

ATI’s “Bolt-On” and “Direct Fit” bells can be used on a 6-bolt, 7-bolt, or 8-bolt case. If mounting the bell with 6 or 7 bolts, (2) threaded Bolt Hole Plugs are included to block off the unused mounting holes. Make sure to use sealant on the plugs. The 7-bolt cases can easily be modified to use all eight mounting bolts simply by drilling and tapping for the 8th bolt. Six bolt cases can have one hole drilled and tapped in the case (same as the 7-bolt version case). For the 8th bolt, the pump bolt hole itself can be drilled and tapped for a heli-coil to run the 5/16” bolt.

STEP 2

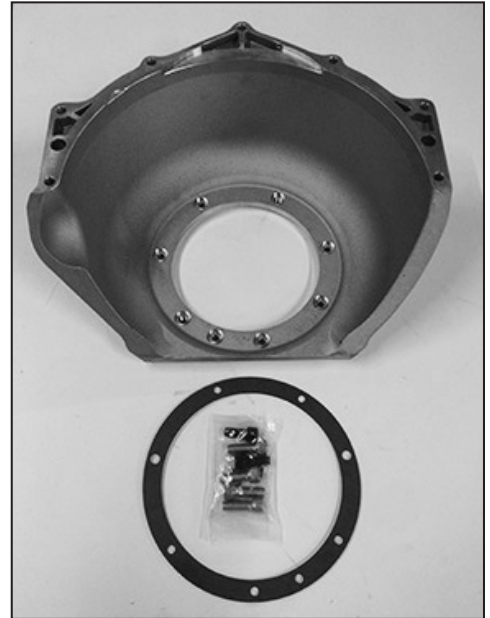
It is best to start with a clean, empty case. While you can cut an assembled transmission, ATI does not recommend it. If you choose to perform this operation on an assembled transmission, care must be taken to cover any and all openings in the unit thoroughly. Remember, metal shavings will find their way into any little crevice and can cause premature failure of the unit. For “Direct Fit” applications, the case MUST be empty as it will need to be mounted on a mill and the output shaft would prevent you from securing it properly.

With the tail housing removed to provide an accurate measuring base, place a straight edge across the rear of the case. Measure forward to mark the bell in several spots for the initial “rough” cut. When you have your marks made, connect them to make a clean straight line so you can follow it with the blade easily. See the chart below for the required measurement depending on the unit you are working on.

APPLICATION	REQUIRED MEASUREMENT
Powerglide	10”
T350	15-1/4”
T400	17-3/4”
Metric 200	14-7/8”

Note: Dimensions may vary from case to case. You need to be sure you do NOT cut into the pan rail or the pump mounting area! (See Figure 1.)

You can use a Sawzall® or a large band saw to remove the original bell. Once you have cut the initial chunk of the bell off, you will want to grind the remaining edge smooth and remove any protruding castings that may interfere with the bell fitment.



Bolt-On Bellhousing Kit

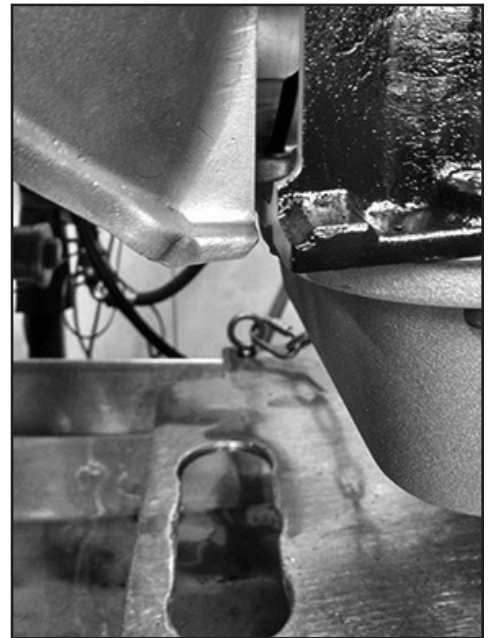


Figure 1

STEP 2

Be sure your pump face is free from burrs or casting flaws. Carefully remove anything that would prevent bell from sitting flush on the pump.

You need a nice, smooth mating surface.
See Figure 2.

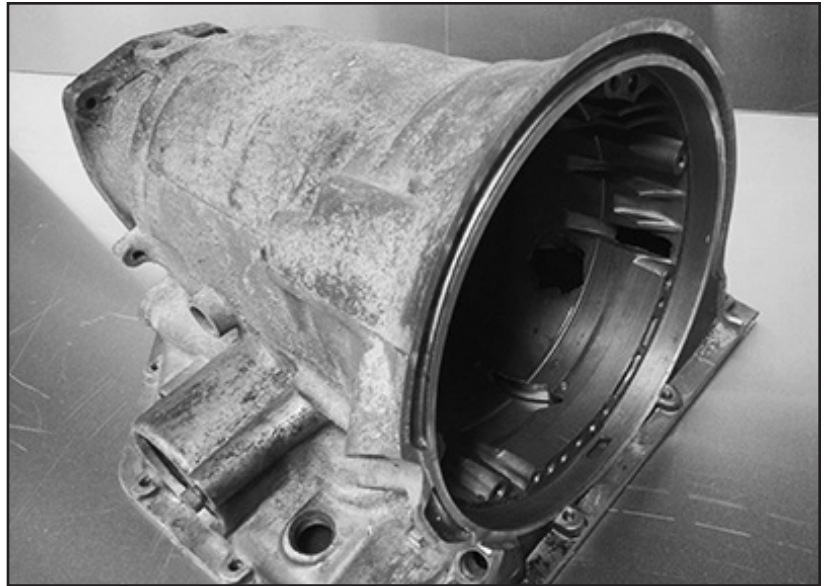


Figure 2

STEP 3

For mock up purposes only, set the complete pump in the case without an o-ring or gasket. Then set the bell in place and secure both with a few bolts. Inspect the entire contact area 360 degrees around and look for areas of interference. If you find any place where the bell is hitting the case, mark it with a Sharpie®, remove the bell and pump, and grind the problem areas until you achieve a proper fit and finish. There should be a small clearance all the way around, minimum of .100"

Once the transmission is assembled and ready for the bell to be installed, be sure you have checked your end play and have the correct thickness 'pump to case' gasket in place. Then place the ATI supplied gasket between the bell housing and pump and use the hardware provided to secure the bell to the transmission. Torque the bolts to 25 ft/lbs and use blue Loctite®.

NOTE:

If you have a mill and would like to prepare your case for the "Direct Fit" version of the bell, call ATI to get specific instructions and measurements before proceeding!